



UTAH DEPARTMENT OF AGRICULTURE AND FOOD

350 N. Redwood Road

P.O. Box 146500

Salt Lake City, UT 84114-6500

(801) 538-7046 Information (801) 538-7169 FAX

AQUATIC INVASIVE SPECIES POLICY STATEMENT

Date: 26 June 2008
To: Growers of Aquatic Animals to be Imported to Utah for Aquaculture
From: Earl Rogers, DVM, Utah State Veterinarian
Kent Hauck, Fish Pathologist
Subject: Requirements for Shipments from Areas Endemic to Aquatic Invasive Species

Introduction: Recent reports on the spread of aquatic invasive species or AIS (zebra mussel, quagga mussel, Conrad's false mussel, New Zealand mud snail, etc.) and the passage of Senate Bill 238 in 2008 have prompted the update of this policy as part of an effort by the Utah Division of Wildlife Resources (DWR) to prevent introduction of AIS. This policy addresses requirements for obtaining an entry permit to import aquatic animals into Utah from areas endemic to AIS or from states east of or intersected by the 100th Meridian. At the present time the endemic states west of the 100th are California, Nevada, Arizona, and Colorado.

***Dreissena* (zebra mussel, quagga mussel, Conrad's false mussel) Treatment or Testing Protocols**

To satisfy import requirements, all importers of aquatic animals to be shipped into Utah shall either treat or test for *Dreissena* mussels prior to shipment. All import states intersected by or east of the 100th Meridian and endemic states west of the 100th Meridian shall use the following **treatment** protocol or they may be considered exempt from treatment by completing the variance request.

TREATMENT^{1,2} protocol and verification notice: The owner/operator of the source facility shall verify completion of the following treatment requirements and complete sections A, B & D of the Notice of Treatment or Testing, Variance, and Distribution of AIS form:

1. One hour pretreatment of the fish and water with 750 mg/L potassium chloride (KCl) (0.63 lb of KCl per 100 gallons of water) followed by 2 hour treatment of the fish in the same water with 25 mg/L formalin (9.5 ml or 0.33 fluid oz of 37% formaldehyde per 100 gallons of water);
2. Place treated fish in pretreated fish transport tanks or unused plastic bags containing mussel-free well water;
3. Complete, sign, and FAX (801-538-7169) the attached **Notice of Treatment or Testing, Variance, and Distribution of AIS** form to UDAF at PO Box 146500, SLC, UT 84114;

All states west of the 100th Meridian and not endemic to *Dreissena* mussels are exempt from treatment and shall meet the following testing protocol.

TESTING protocol and verification notice: The owner/operator of the source facility shall complete sections A, C & D of the Notice of Treatment or Testing, Variance, and Distribution of AIS form to verify:

1. All aquatic animals in the shipment have been reared and transported in well water that is verified free of *Dreissena* mussels and AIS and the transport tank has been disinfected prior to loading;
2. The source farm is inspected annually for AIS by a competent authority, is certified clean, and the last inspection report is attached;
3. I have examined the export facility waters, aquatic animals, and transport tank for AIS listed on the UDAF *List of Aquatic Invasive Species* and did not detect the listed AIS. The New Zealand mud snail and other species on the UDAF *List of Aquatic Invasive Species* are not found within 100 miles of my facility.

Following the review of this notice, UDAF will contact the import applicant, transport and/or hatchery manager regarding the entry permit.

¹Reference for treatment protocol: Edwards, WJ, Babcock-Jackson, L, DA Culver. 2002. Field testing of protocols to prevent the spread of zebra mussels *Dreissena polymorpha* during fish hatchery and aquaculture activities. NA Journal of Aquaculture 64:220-223.

²Reference for survival of fish treated with the above protocol: Edwards, WJ, Babcock-Jackson, L, DA Culver. 2000. Prevention of the spread of zebra mussels during fish hatchery and aquaculture activities. NA Journal of Aquaculture 62:229-236.



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Notice of Treatment or Testing, Variance and Verification of Distribution of Aquatic Invasive Species (AIS)

Log # _____

Instructions: Complete EITHER sections A, B, and D OR sections A, C, and D, then sign, date, and forward to UDAF.

A. Owner or Exporter _____
 Address _____
 Phone/FAX _____ Email _____
 Current Utah Fish Health Approval Number _____
 Name of export facility (if other than above) _____
 Species, size/age, and number of aquatic animals proposed for export to Utah

B. I, the undersigned, verify that the **TREATMENT** of the above-listed animals and/or transport vehicle for *Dreissena* mussels (zebra mussel, quagga mussel, Conrad's false mussel) was conducted by me on the below date according to Utah policy prescribed in this policy. I further verify that I have inspected the transport vehicle and that no adult mussels are in the transport vehicle or in the transport water used for shipment. If another treatment was used, please specify here:

C. I, the undersigned, verify that I have completed all the below TEST requirements or I request that a **VARIANCE from TREATMENT** for *Dreissena* mussels and/or other AIS be granted by UDAF based on the following information (*check all applicable boxes*):

- I request a variance** from treatment and specify the reasons by checking all appropriate boxes below:
 - I do not request a variance** from treatment and specify the test information by checking all appropriate boxes below:
 - I have examined the export facility waters, aquatic animals, transport vehicle and transport water for AIS listed on the UDAF *List of Aquatic Invasive Species* and did not detect AIS
 - My state is west of or not intersected by the 100th Meridian
 - None of the species of *Dreissena* mussels as defined under section B above is found within my state
 - None of the species of *Dreissena* mussels as defined under section B above is found on my farm
 - The New Zealand mud snail is not found at or within 100 miles of my facility
 - The fish/eggs to be exported to Utah were reared for all life stages in well water free of *Dreissena* mussels and other AIS
 - The fish/eggs will be shipped to Utah in well water free of *Dreissena* mussels and other AIS
 - The transport tank has been disinfected prior to this shipment to Utah, is always disinfected following each shipment and does not harbor AIS. Disinfection method used: _____
 - My farm is inspected annually for AIS by a competent authority, is certified clean, and the last inspection report is attached
 Specify date _____ of most recent AIS training, inspector's name _____
 and name _____ and phone number _____ of training organization.
 - Other reasons (specify) _____
- Name of the watershed infested with *Dreissena* mussels, which is closest to my farm: _____
 Name of other watersheds harboring AIS, and distance from my farm: _____
 Other pertinent AIS control information: _____

VERIFICATION OF DISTRIBUTION OF AIS

D. I, the undersigned, verify to the best of my knowledge that the species listed on the UDAF *List of Aquatic Invasive Species* are not found at or within 100 miles of my facility. If other than stated above, the name(s) of the watershed(s) and of the aquatic invasive species closest to my facility are as follows:

Name(s) of AIS: _____
 Watershed name and distance of AIS infested watershed from my facility: _____

I further verify the statements made here are true and correct.

Signed _____ Date _____